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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/762,472	03/29/2001	Michael Eder	449122002000	4686

7590

04/04/2006

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2000 Pennsylvania Avenue NW
Washington, DC 20006-1888

EXAMINER

ZHEN, LI B

ART UNIT	PAPER NUMBER
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2194

DATE MAILED: 04/04/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/762,472

Applicant(s)

EDER ET AL.

Examiner

Li B. Zhen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 09 January 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.

4) ☐ **WILLIAM THOMSON**
SUPERVISOR
Patent Examiner
5) ☐ Notice of Informal Patent Application (PTO-152)

6) ☐ Other: _____

DETAILED ACTION

1. Claims 1 – 11 are pending in the application.

Continued Examination Under 37 CFR 1.114

2. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 01/09/2006 has been entered.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:
The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
4. Claims 1 – 7 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
5. Claims 1 and 2 recites the limitation "the exchange occurs between the application programs by means of a connection program" in lines 12 – 13. There is insufficient antecedent basis for this limitation in the claim. It is unclear if "the exchange" is referring to "an exchange" (i.e., telephone exchange or switch) as recited in line 1 of the respective claims or if "the exchange" is referring to the exchanging of signaling data and call data.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

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invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 1 – 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Statutory Invention Registration No. H1,898 to Doughty et al. [hereinafter referred to as Doughty] in view of U.S. Patent NO. 6,009,093 to Choe.

8. As to claim 1, Doughty teaches the invention substantially as claimed including a method for operating a terminal unit [terminals 54; col. 7, lines 7 – 17] in an exchange [telecommunications switch 12; col. 7, lines 7 - 17] comprising:

performing signaling for a first subscriber [call processor 49 provides other elements that take part in processing calls directed to, or initiated by, the subscriber units 22; col. 6, lines 27 – 38] during execution of a first application program [signal processing modules 48; col. 4, lines 57 – 67] by a processor [processor; col. 4, lines 39 – 49] included in the terminal unit wherein

call processing between the first subscriber and a second subscriber is carried out during execution of a second application program [call processor 49 includes a call processing application that provides various call processing and signaling functions, such as call origination and termination functions, as well as location updating and handover of mobile subscribers; col. 6, lines 27 – 39 and col. 8, lines 50 – 61],

transferring signaling data, generated during signaling, at a message interface are transferred to the second application program [Each signaling interface module may controllably receive signaling data from and transfer signaling data to the transmission link 26; col. 11, lines 15 – 29] by using an operating system [switching module 42 runs a suitable operating system such as pSOS+; col. 4, lines 38 – 49] for controlling the flow of the application programs [col. 8, lines 37 – 49], and

transferring call data, generated during call processing, at the message interface to the first application program by using the operating system [the call processor system 49 configures the switching module 42, the telephony support module 44, the interface modules 46, and the signal processing modules 48 to process the call data; col. 7, lines 35 - 45]. Although Doughty teaches the invention substantially, Doughty does not

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specifically teach the exchange occurs between the application programs by means of a connection program.

9. However, Choe teaches exchanges with network terminals [col. 4, lines 27 – 50] and a connection program for exchange between application programs [exchange main module interface 21 exchanges signaling information with the central processing module CPM 10 through the common memory; col. 8, lines 8 – 55].

10. It would have been obvious to a person of ordinary skilled in the art at the time of the invention to apply the teaching of a connection program for exchange between application programs as taught by Choe to the invention of Doughty because this provides an interface apparatus having a layered architecture based on an OSI reference model for exchanging voice and data communications between said private exchange and ISDN [col. 2, lines 14 - 20 of Choe].

11. As to claim 2, Doughty as modified teaches a method for operating terminal unit [terminals 54; col. 7, lines 7 – 17 of Doughty] in an exchange [telecommunications switch 12; col. 7, lines 7 – 17 of Doughty] comprising:

performing signaling with aid of a further exchange by a processor [processor; col. 4, lines 39 – 49] included in the terminal unit during execution of a first application program [signal processing modules 48; col. 4, lines 57 – 67 of Doughty],

call processing between the two exchanges during execution of a second application program [call processor 49 includes a call processing application that provides various call processing and signaling functions, such as call origination and termination functions, as well as location updating and handover of mobile subscribers; col. 6, lines 27 – 39 and col. 8, lines 50 – 61 of Doughty],

transferring signaling data, generated during signaling, at a message interface to the second application program [Each signaling interface module may controllably receive signaling data from and transfer signaling data to the transmission link 26; col. 11, lines 15 – 29 of Doughty] by using an operating system [switching module 42 runs a suitable operating system such as pSOS+; col. 4, lines 38 – 49 of Doughty] for controlling the flow of the application programs [col. 8, lines 37 – 49 of Doughty],

transferring call data, generated during call processing at the message interface to the first application program using operating system [the call processor system 49 configures the switching module 42, the telephony support module 44, the interface modules 46, and the signal processing modules 48 to process the call data; col. 7, lines 35 – 45 of Doughty], and

the exchange occurs between the application programs by means of a connection program [exchange main module interface 21 exchanges signaling information with the central processing module CPM 10 through the common memory; col. 8, lines 8 – 55 of Choe].

12. As to claim 3, Doughty as modified teaches the generated signaling data or the call data contain messages with a prescribed structure [col. 9, lines 7 – 25 of Doughty].

13. As to claim 4, Doughty as modified teaches the messages contain receiver identifier, or an address reference on a data block with data to be transmitted, or a message identifier for distinguishing the different messages, or a message type identifier for identifying the type of message, or data on the application program generating the message [col. 9, lines 7 – 25 of Doughty].

14. As to claim 5, Doughty as modified teaches the signaling data and/or the call data contain a data block, and wherein, in addition to data to be transmitted, the data block preferably contains further data with the aid of which the data block can be assigned to one more application programs [transmit appropriate signaling and control data; col. 4, lines 21 – 34 of Doughty].

15. As to claim 6, Doughty as modified teaches two first application programs are used for signaling with the aid of different protocols [col. 9, lines 24 – 35 of Doughty], and wherein the first application programs exchange at least one of signaling data and call data with second application programs via common or a plurality of interfaces, and wherein the same command sequence is executed during processing of the second

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application programs [signaling interface modules 52; col. 6, line 63 – col. 7, line 8 of Doughty].

16. As to claim 7, Doughty as modified teaches two second application programs with identical different command sequences are used, wherein the application program exchanges signaling data and/or call data with the second application programs via a common or a plurality of message interfaces, and wherein the same command sequence preferably used in the case of second application programs with identical command sequences [signaling interface modules 52; col. 6, line 63 – col. 7, line 8 of Doughty].

17. As to claim 8, Doughty as modified teaches a terminal [terminals 54; col. 7, lines 7 – 17 of Doughty] for an exchange [telecommunications switch 12; col. 7, lines 7 – 17 of Doughty], comprising:

- at least one subscriber line for connecting a first subscriber [col. 3, lines 46 – 64 of Doughty];

- at least one further connection for setting up a transmission channel to a second subscriber [col. 8, lines 3 – 11 of Doughty];

- application programs for executing switching operations, to which signaling at the subscriber line and method steps for call processing belong [switching module 42; col. 4, lines 38 – 49 of Doughty], wherein signaling data generated during signaling is used when processing a call, or call data generated during call processing is used when signaling [call processor 49 includes a call processing application that provides various call processing and signaling functions, such as call origination and termination functions, as well as location updating and handover of mobile subscribers; col. 6, lines 27 – 39 and col. 8, lines 50 – 61 of Doughty]; and

- an operating system controlling the flow of the application programs [switching module 42 runs a suitable operating system such as pSOS+; col. 4, lines 38 – 49 of Doughty], wherein at least one of the signaling data and the call data are transferred to at least one message interface using the operating system [exchange main module

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interface 21 exchanges signaling information with the central processing module CPM 10 through the common memory; col. 8, lines 8 – 55 of Choe].

18. As to claim 9, Doughty as modified teaches the terminal unit [terminals 54; col. 7, lines 7 – 17 of Doughty] for an exchange [telecommunications switch 12; col. 7, lines 7 – 17 of Doughty], comprising:

at least one connection for connecting a further exchange [control programs for the connection of the private exchange to the ISDN; col. 2, lines 21 – 50 of Choe];

application programs for executing switching operations [switching module 42; col. 4, lines 38 – 49 of Doughty], to which signaling at the connection and method steps for call processing belong, wherein signaling data generated during signaling is used when processing a call, or call data generated during call processing is used when signaling [call processor 49 includes a call processing application that provides various call processing and signaling functions, such as call origination and termination functions, as well as location updating and handover of mobile subscribers; col. 6, lines 27 – 39 and col. 8, lines 50 – 61 of Doughty]; and

an operating system controlling the flow of the application programs [switching module 42 runs a suitable operating system such as pSOS+; col. 4, lines 38 – 49 of Doughty], wherein at least one of the signaling data the call data are transferred to at least one message interface using the operating system [exchange main module interface 21 exchanges signaling information with the central processing module CPM 10 through the common memory; col. 8, lines 8 – 55 of Choe].

19. As to claim 10, Doughty as modified teaches signaling is executed by a first application program [signal processing modules 48; col. 4, lines 57 – 67 of Doughty], and wherein call processing is executed by a second application program [call processor 49 includes a call processing application that provides various call processing and signaling functions, such as call origination and termination functions, as well as location updating and handover of mobile subscribers; col. 6, lines 27 – 39 and col. 8, lines 50 – 61 of Doughty].

20. As to claim 11, Doughty as modified teaches an exchange [telecommunications switch 12; col. 7, lines 7 – 17 of Doughty] comprising a terminal unit [terminals 54; col. 7, lines 7 – 17 of Doughty] having at least one subscriber line for connecting a first subscriber [col. 8, lines 3 – 11 of Doughty];

at least one further connection for setting up a transmission channel to a second subscriber [transmission channels; col. 7, lines 52 – 64 of Doughty];

application programs for executing switching operations [switching module 42; col. 4, lines 38 – 49 of Doughty], to which signaling at the subscriber line and methods steps for call processing belong, wherein signaling data generated during signaling is used when processing a call, or call data generated during call processing is used when signaling [call processor 49 includes a call processing application that provides various. call processing and signaling functions, such as call origination and termination functions, as well as location updating and handover of mobile subscribers; col. 6, lines 27 – 39 and col. 8, lines 50 – 61 of Doughty]; and

an operating system controlling the flow of the application programs [switching module 42 runs a suitable operating system such as pSOS+; col. 4, lines 38 – 49 of Doughty], wherein at least one of the signaling data and the call data are transferred to one message interface using the operating system [exchange main module interface 21 exchanges signaling information with the central processing module CPM 10 through the common memory; col. 8, lines 8 – 55 of Choe].

CONTACT INFORMATION

21. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Li B. Zhen whose telephone number is (571) 272-3768. The examiner can normally be reached on Mon - Fri, 8:30am - 5pm.

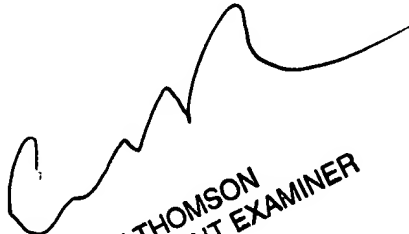
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, William Thomson can be reached on 571-272-3718. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Li B. Zhen
Examiner
Art Unit 2194

lbz



WILLIAM THOMSON
SUPERVISORY PATENT EXAMINER